

IN THE CLAIMS

Please amend the claims as follows:

Claim 1 (Previously Presented): An optical scanning apparatus, comprising:

two optical scanning systems, each including at least one light source configured to emit a light beam, and at least one beam shaping mechanism configured to shape each light beam; and

a light deflector configured to deflect each light beam in a continuously changing direction thereby converting each light beam into a scanning light beam,

each of said two optical scanning systems further including at least one scanning beam focusing mechanism configured to bring the scanning light beam to a focus on a photoconductive surface, each scanning beam focusing mechanism satisfying an equation:

$\Delta L \cos \alpha < R/2$ at a junction of the scanning light beams with each other on the photoconductive surface,

wherein ΔL represents an inherent light pass length variation between central light passage lengths of the first and second optical systems, α represents an incident angle, and R represents an inherent marginal distance.

Claim 2 (Original): The optical scanning apparatus as defined in Claim 1, wherein each of said at least two scanning beam focusing mechanisms includes a telecentric $f \theta$ lens system.

Claim 3 (Original): The optical scanning apparatus as defined in Claim 1, wherein each of said at least two scanning beam focusing mechanisms includes a telecentric $f \theta$ mirror system.

Claim 4 (Previously Presented): The optical scanning apparatus, comprising:
two optical scanning systems, each including at least one light source means for emitting a light beam, and at least one beam shaping means for shaping the light beam; and
light deflecting means for deflecting each light beam in a continuously changing direction thereby converting each light beam into a scanning light beam,

each of said two optical scanning systems further including at least one scanning beam focusing means for bringing the scanning light beam to a focus on a photoconductive surface, each scanning beam focusing means satisfying an equation:

$\Delta L \cos \alpha < R/2$ at a junction of the scanning light beams with each other on the photoconductive surface,

wherein ΔL represents an inherent light pass length variation between central light passage lengths of the first and second optical systems, α represents an incident angle, and R represents an inherent marginal distance.

Claim 5 (Original): The optical scanning apparatus as defined in Claim 4, wherein each of said at least two scanning beam focusing means includes a telecentric $f \theta$ lens system.

Claim 6 (Original): The optical scanning apparatus as defined in Claim 4, wherein each of said at least two scanning beam focusing means includes a telecentric $f \theta$ mirror system.

Claim 7 (Previously Presented): A method of optical scanning including two optical scanning systems, comprising the steps of:

emitting at least two light beams;

shaping said at least two light beams;

deflecting each of said at least two light beams in a continuously changing direction so as to convert each of said at least two light beams into a scanning light beam; and

bringing the scanning light beam to a focus on a photoconductive surface using at least two scanning beam focusing mechanisms each of which satisfies an equation:

$\Delta L \cos \alpha < R/2$ at a junction of the scanning light beam with the other scanning light beam on the photoconductive surface,

wherein ΔL represents an inherent light pass length variation between central light passage lengths of the first and second optical systems, α represents an incident angle, and R represents an inherent marginal distance.

Claim 8 (Original): The method as defined in Claim 7, wherein each of said at least two scanning beam focusing mechanisms includes a telecentric $f \theta$ lens system.

Claim 9 (Original): The method as defined in Claim 7, wherein each of said at least two scanning beam focusing mechanisms includes a telecentric $f \theta$ mirror system.

Claim 10 (Currently Amended): An image forming apparatus, comprising:

a photoconductive member; and

an optical scanning apparatus including,

at least two light sources each configured to emit a light beam;

at least two beam shaping mechanisms each configured to shape the light beam;
a light deflector configured to deflect each light beam in a continuously changing direction thereby converting each light beam into a scanning light beam; and
at least two scanning beam focusing mechanisms each configured to bring the scanning light beam to a focus on a surface of said photoconductive member, each of said at least two scanning beam focusing mechanisms satisfying an equation:
$$\Delta L \cos \alpha > R/2 \quad \Delta L \cos \alpha < R/2$$
 at a junction of the scanning light beam with the other scanning beam on the surface of said photoconductive member,
wherein ΔL represents an inherent light pass length variation, α represents an incident angle, and R represents an inherent marginal distance.

Claim 11 (Original): The image forming apparatus as defined in Claim 10, wherein each of said at least two scanning beam focusing mechanisms includes a telecentric $f \theta$ lens system.

Claim 12 (Original): The image forming apparatus as defined in Claim 10, wherein each of said at least two scanning beam focusing mechanisms includes a telecentric $f \theta$ mirror system.

Claim 13 (Currently Amended): An image forming apparatus, comprising:
photoconductive means for being photoconductive; and
an optical scanning apparatus that includes,
at least two light source means each for emitting a light beam;
at least two beam shaping means each for shaping the light beam;

light deflecting means for deflecting each light beam in a continuously changing direction so as to convert each light beam into a scanning light beam; and

at least two scanning beam focusing means for bringing each scanning light beam to a focus on a surface of said photoconductive means, each of said at least two scanning beam focusing means satisfying an equation:

~~$\Delta L \cos \alpha > R/2$~~ $\Delta L \cos \alpha < R/2$ at a junction of the scanning light beam with each other on the surface of said photoconductive means,

wherein ΔL represents an inherent light pass length variation, α represents an incident angle, and R represents an inherent marginal distance.

Claim 14 (Original): The image forming apparatus as defined in Claim 13, wherein each of said at least two scanning beam focusing means includes a telecentric $f \theta$ lens system.

Claim 15 (Original): The image forming apparatus as defined in Claim 13, wherein each of said at least two scanning beam focusing means includes a telecentric $f \theta$ mirror system.

Claim 16 (Currently Amended): A method of image forming, comprising the steps of:

charging a surface of a photoconductive member;

emitting at least two light beams;

shaping said at least two light beams;

deflecting each of said at least two light beams in a continuously changing direction thereby converting each of said at least two light beams into a scanning light beam; and

bringing the scanning light beam to a focus on the surface of the photoconductive member with at least two scanning beam focusing mechanisms each of which satisfies an equation:

~~$\Delta L \cos \alpha > R/2$~~ $\Delta L \cos \alpha < R/2$ at a junction of the scanning light beam with each other on the photoconductive surface,

wherein ΔL represents an inherent light pass length variation, α represents an incident angle, and R represents an inherent marginal distance.

Claim 17 (Original): The method as defined in Claim 16, wherein each of said at least two scanning beam focusing mechanisms includes a telecentric $f \theta$ lens system.

Claim 18 (Original): The method as defined in Claim 16, wherein each of said at least two scanning beam focusing mechanisms includes a telecentric $f \theta$ mirror system.